TEXAS DEPARTMENT OF INSURANCE

Engineering Services / MC 103-3A 333 Guadalupe Street P.O. Box 149104 Austin, Texas 78714-9104 Phone No. (512) 322-2212 Fax No. (512) 463-6693

PRODUCT EVALUATION

WIN-507

Effective July 1, 2011

The following product has been evaluated for compliance with the wind loads specified in the **International Residential Code** (IRC) and the **International Building Code** (IBC). This product shall be subject to reevaluation **January 2015**.

This product evaluation is not an endorsement of this product or a recommendation that this product be used. The Texas Department of Insurance has not authorized the use of any information contained in the product evaluation for advertising, or other commercial or promotional purpose.

This product evaluation is intended for use by those individuals who are following the design wind load criteria in Chapter 3 of the IRC and Section 1609 of the IBC. The design loads determined for the building or structure shall not exceed the design load rating specified for the products shown in the limitations section of this product evaluation. This product evaluation does not relieve a Texas licensed engineer of his responsibilities as outlined in the Texas Insurance Code, the Texas Administrative Code and the Texas Engineering Practice Act.

Series 2945 Vinyl Double Hung Replacement Windows, Non-impact Resistant, manufactured by

Window Mart P.O. Box 570 5760 Albert Pike Royal, Arkansas 71968 Telephone: (888) 283 - 6278

will be acceptable in designated catastrophe areas along the Texas Gulf Coast when installed in accordance with the manufacturer's installation instructions and this product evaluation.

PRODUCT DESCRIPTION

The Series 2945 window is a vinyl double hung replacement window. The double hung replacement windows evaluated in this report are individual, non-impact resistant windows. This product evaluation report is for vinyl double hung replacement windows based on the following tested constructions:

General Description:

System	Description	Label Rating	Certification Authorization Number (CAR)
1	Series 2945 Vinyl Double Hung Window; (X/X)	H-R30 48 x 72	588-141
2	Series 2945 Vinyl Double Hung Window; (X/X)	H-R50 40 x 63	588-143

Product Dimensions:

System	Overall Size	Upper Sash Size	Lower Sash Size
1	48" x 72"	44 ½ " x 34 ½ "	45 ½ " x 35 ½ "
2	40" x 63"	36 ½ " x 29 ½ "	37 ½ " x 30 ½ "

Glazing Description:

System	Glass Construction 1	Glazing Method ²
1	IG-1	GM-1
2	IG-1	GM-1

Note:

Glass Construction Key:

IG-1: Both sashes contain sealed insulating glass units. The sealed insulating glass units are comprised of two single strength ($\frac{3}{32}$ ") annealed glass lites separated by a Steel reinforced butyl spacer system. The glass thickness and type used in the insulating glass unit of the tested assembly and in smaller assemblies shall comply with ASTM E 1300-04.

Glazing Method Key:

GM-1: The insulating glass units are set from the exterior against double-sided adhesive foam tape. A rigid vinyl snap-in glazing bead secures the insulating glass units from the exterior.

Frame Construction: The frame members are manufactured from extruded vinyl (PVC). The frame corners are mitered and welded construction.

Sash Construction: The sash members are manufactured from extruded vinyl (PVC). The sash corners are mitered and welded construction.

Hardware:

- Metal cam lock; Two (2) required; Located on the lock rail.
- Metal keeper; Two (2) required; Located on the exterior meeting rail.
- Tilt latches; Four (4) required; the top corners of both sashes
- Metal pivot bar; Four (4) required; Located at the bottom and the exterior meeting rails.
- Constant force balance; Four (4) required; Located in the side jambs, two per sash
- Plastic flush mounted tilt latch; Four (4) required; Located at the top rail and the lock rail, one at each end.

Reinforcement: Extruded aluminum reinforcement is located in the exterior meeting rail and in the lock rail. The reinforcement extends the length of the members.

Product Identification: A certification program label (Keystone) will be affixed to the window. The certification program label includes the performance characteristics and approved inspection agency to indicate compliance with the requirements of AAMA/WDMA/CSA 101/I.S.2/A440-05. The certification program label contains a Certification Authorization Report (CAR) number located on the top right side of the label and a model name for the window. The following CAR number and model name is located on the label:

¹See the "Glass Construction Key" for the glazing construction.

² See the "Glazing Method Key" for the glazing method description.

Label Identification:

	Certification Authorization Report (CAR) nu	
System	Model	Label with AAMA/WDMA/CSA 101/I.S.2/A440-05
1	2945 Vinyl Double Hung	588-141
2	2945 Vinyl Double Hung	588-143

LIMITATIONS

Design pressures:

System	Maximum Width (in.)	Maximum Height (in.)	Design Pressures (psf)
1	48	72	± 30
2	40	63	± 50

Impact Resistance: These window assemblies do not satisfy the Texas Department of Insurance's criteria for protection from windborne debris. These window assemblies will need to be protected with an impact protective system when installed in areas where windborne debris is required.

Acceptance of Smaller Assemblies: Window assemblies with dimensions equal to or smaller than those specified above are acceptable within the limitations specified in this report.

INSTALLATION INSTRUCTIONS

General: The window assembly shall be installed in accordance with the manufacturer's installation instructions. Detailed drawings and installation instructions are available from the manufacturer.

Installation: The wood wall framing members shall be minimum Spruce-Pine-Fir dimension lumber. The window shall be mounted to the wood wall framing members using the frame jambs of the window with minimum No. 8 screws. The fasteners shall be located approximately 6 inches from each corner. Wood blind stops (minimum $3\frac{3}{4}$ " x $1\frac{1}{2}$ " x $\frac{3}{4}$ " are required along the interior and exterior of the window. Each wood blind stop is secured to the wall framing with minimum No. 8 screws. The fasteners shall be long enough to penetrate a minimum of $1\frac{1}{2}$ inches into the wall framing members.

Note: The manufacturer's installation instructions shall be available on the job site during installation. All fasteners shall be corrosion resistant as specified in the International Residential Code (IRC), the International Building Code (IBC), and the Texas Revisions.